

2. UNEs Provide Many Benefits

Given the incumbent LECs' continued bottleneck control over local facilities, unbundling is necessary to promote customer choice, innovation, and efficient investment. No competitive company currently has the resources to build a ubiquitous, end-to-end, facilities-based network capable of competing with the incumbent LECs. Nor does any competitive provider currently have a customer base sufficient to justify such a build out. Thus, in the absence of UNEs, competitive LECs will be forced to rely solely on resale to provide their services. This would limit competitors to offering only those services offered by the incumbent LEC, thereby depriving consumers of meaningful choice in the market. In addition, resale also has proven not to be economically viable for most competitors in most markets. Access to UNEs, including UNE-P, expands consumer choice by allowing competitive LECs to concentrate on areas where they can differentiate themselves from the incumbents (*e.g.*, customer service and product innovation) while leasing underlying facilities from incumbent LECs.¹⁵⁶ UNEs are more important than ever given the difficulties competitive carriers currently are facing in raising the capital needed to deploy their own facilities.

Limiting competition to resale would also greatly reduce, if not eliminate, any incentive the incumbent LECs have to innovate. It was competitive pressure from the competitive data LECs, such as Covad and Rhythms, that encouraged the incumbent LECs to roll out DSL, for example.¹⁵⁷ These competitive data LECs combined UNEs obtained from incumbent LECs with their own facilities to introduce DSL and high-speed Internet access to a wide market. The incumbent LECs' own investment in DSL as a

¹⁵⁶ See, *e.g.* *Graham Declaration* at ¶¶ 38-41.

¹⁵⁷ See *Review of Regulatory Requirements for Incumbent LEC Broadband Telecommunication Services*, CC Docket No. 01-337, Declaration of Daniel Kelley, filed as Attachment A to Comments of WorldCom, Inc. (March 1, 2002) at ¶ 8 (noting that competitive LECs pioneered the commercialization of DSL services).

retail product to provide Internet access service came largely as a response to the early success of the competitive data LECs.¹⁵⁸

In addition, UNEs promote efficient investment by allowing a competitive carrier to reach customers in locations where demand is not yet sufficient to justify the investment needed for the carrier to build out its own network. In this way, UNEs allow end users outside of the most densely populated areas to enjoy the benefits of competition.

3. The Commission Should Continue to Apply the Standards Adopted in the *UNE Remand Order*

The Act requires an incumbent LEC to provide unbundled access to a non-proprietary network element if failure to provide access to that element would “impair” the requesting carrier’s ability to provide the service that it seeks to offer.¹⁵⁹ In interpreting this statutory requirement, the Commission should continue to apply the impairment standard established in the *UNE Remand Order*. As the Commission correctly concluded in that order, failure to provide access to a non-proprietary element “impairs” a requesting carrier if “lack of access to that element materially diminishes a requesting carrier’s ability to provide the services it seeks to offer.”¹⁶⁰ This standard properly focuses on the competitive consequences of making an element available. It also takes account of the distinction between “impair” and “necessary” that Congress incorporated into the statute.¹⁶¹ Finally, it makes little sense to alter the existing standard

¹⁵⁸ The ILECs’ continuing deployment of DSL today is also a response to cable modem service.

¹⁵⁹ 47 U.S.C. § 251(d)(2)(B).

¹⁶⁰ *UNE Remand Order* at ¶ 51.

¹⁶¹ In adopting the current “impair” standard, the FCC correctly rejected suggestions from the ILECs, which had proposed that the “impair” standard incorporate the strict “essential facilities” standard used in antitrust analysis. But, as the Commission understood, any claim that “impair” should mean “necessary” or “essential” fails to honor the distinction

now, given that is currently subject to judicial review by the U.S. Court of Appeals for the D.C. Circuit. Continuing to apply the current standard (if it passes judicial muster), or changing it only as required to conform with court rulings (if it does not), would lead to greater certainty and would minimize the likelihood of further appeals and challenges.

In the *NPRM*, the Commission asks whether cost should be afforded less weight than the other factors the Commission has traditionally considered in making its impairment analysis.¹⁶² To the contrary, cost is perhaps the most important factor forcing CLECs to depend on ILEC facilities notwithstanding all of the obvious commercial problems such reliance entails. With enough money, CLECs could in theory duplicate any ILEC facility. But because of the scale and scope economies that characterize the telecommunications industry, no one would sensibly fund such construction; nor would it be socially useful. Unless cost is taken into consideration, impairment analysis will fail to account for the single most important factor that forces CLECs to depend upon ILEC facilities.

As demonstrated below, CLECs' ability to offer the services their customers demand will be "impaired" (as that term was defined in the *UNE Remand Order*) unless they can obtain nondiscriminatory access to UNE-P, unbundled loops, subloops, transport, switching, network interface devices, signaling networks and call-related databases, and operations support systems – all of which are non-proprietary¹⁶³ – at cost-based rates.

Congress drew between access to proprietary elements, where competitors had to show that access to the element was "necessary," and access to other elements, where the lesser "impair" standard applied. In giving meaning to the lesser standard Congress intended to apply for non-proprietary elements, the Commission correctly focused on competitive consequences that were material, but not so extreme as to make access to the element "necessary."

¹⁶² *NPRM* at ¶ 19.

¹⁶³ An element is "proprietary" if it is protected by patent, copyright or trade secret law. See *UNE Remand Order* at ¶ 35. Incumbent LECs must unbundle those proprietary

Under the standard established in the *UNE Remand Order*, the Commission in the past also has considered whether an unbundling obligation is likely to: (1) encourage competitive LECs to enter the local market rapidly and serve the greatest number of consumers; (2) advance the development of facilities-based competition by competitors, and encourage investment and innovation in new technologies and new services by both incumbent LECs and competitive LECs; (3) reduce regulation of UNEs as alternatives to the incumbent LECs' network elements become available in the future; (4) provide certainty in the marketplace that will allow new entrants and fledgling competitors to develop national and regional business plans and bring the benefits of competition to the greatest number of consumers; and (5) be administratively practical to apply.¹⁶⁴ These factors should be considered to permit further unbundling, even if competitors are not impaired. But, given Congress's focus on impairment, these factors should not be used to "trump" impairment and deny carriers access when they are impaired. All of these factors weigh in favor of providing competitive carriers with unbundled access to the network elements discussed below.

4. The Commission Should Reject Attempts to Impose Additional Impediments to Competitive Carriers' Ability to Obtain and Utilize UNEs

The Commission has sought to provide new entrants with the regulatory certainty they need as they devise their entry strategies, develop long-term business plans and attempt to raise capital. For example, in the *Local Competition Order*, the Commission provided a list specifying the network elements that competitive carriers were entitled to obtain from incumbent LECs pursuant to section 251(c)(3). Competitive carriers relied

elements that are "necessary" to competitors. 47 U.S.C. § 251(d)(2)(A); *UNE Remand Order* at ¶ 29.

¹⁶⁴ *UNE Remand Order* at ¶ 27.

on this list in determining the best course for entering – and competing in – the local telecommunications business.

The incumbent LECs have taken every opportunity to undermine the certainty the Commission has tried to provide, however. They intentionally ignore or misinterpret Commission rules, relentlessly challenge Commission orders through litigation and seek to revise Commission rules through legislation. The incumbent LECs now attempt to limit the availability of UNEs by arguing for geographic, technical and use restrictions on UNEs, as well as a new service-specific impairment standard. If these arguments prevail, the incumbent LECs will have succeeded in making UNEs unavailable as a practical matter.

In the sections below, WorldCom explains why the FCC should reject the incumbent LECs' attempts to impose use and geographic restrictions on UNEs, and should not conduct a service-specific impairment test. Technical restrictions are discussed in the context of individual UNEs, as are attempts to exempt new facilities and services from the unbundling rules.

a) The Commission Should Not Impose Use Restrictions on UNEs

The Act broadly commands that the incumbent LECs must “provide, to any requesting telecommunications carrier for the provision of a telecommunications service, nondiscriminatory access” to the individual elements of their networks.¹⁶⁵ Thus, the only restriction Congress imposed on the use of UNEs was to require that they be utilized “for the provision of a telecommunications service.”¹⁶⁶ As long as a competitor uses the leased element to provide a telecommunications service, the FCC cannot further limit the

¹⁶⁵ 47 U.S.C. § 251(c)(3).

¹⁶⁶ *Id.*

uses to which the carrier puts those elements.¹⁶⁷ As the Commission recognized in the *Local Competition Order*, while “[a] single network element can be used to provide many different services . . . Section 251(c)(3) does not impose any service-related restrictions or requirements on requesting carriers in connection with the use of unbundled network elements.”¹⁶⁸

Congress's intent to allow unfettered use of unbundled network elements is equally clear in the definition of “network element” itself. Congress defined that term broadly, to include “a facility or equipment used in the provision of a telecommunications service,” including all “features, functions and capabilities that are provided by means of such facility or equipment.”¹⁶⁹ As the Commission correctly understood when it issued the *Local Competition Order*, these two provisions in conjunction make clear Congress's intention that competitors should have the ability to use an unbundled telephone facility to provide any “capability” that facility is capable of providing.

The ILECs nevertheless have urged the Commission to reverse course and adopt the contrary interpretation of these provision, insisting that the Commission should restrict the kinds of services that competitors can provide through leased facilities. In their view, section 251(d)(2) gives the FCC the authority to limit the uses to which

¹⁶⁷ Since Congress expressly imposed only one use restriction – limiting the availability of UNEs to “the provision of telecommunications service” – it must be assumed that Congress did not intend for the Commission to devise additional restrictions further limiting the use of UNEs beyond the statutory text. *See, e.g., Halverson v. Slater*, 129 F.3d 180, 186-187 (D.C. Cir. 1997) (limited language of delegation of authority to an administrative agency is fairly read to confine the scope of the delegation to the limited terms of the statute).

¹⁶⁸ *Local Competition Order* at ¶ 264; *accord, UNE Remand Order* at ¶ 484. The ruling from the *Local Competition Order* was codified in 47 C.F.R. § 51.307(c) (requiring incumbent LECs to provide access to UNEs “in a manner that allows the requesting telecommunications carrier to provide any telecommunications service that can be offered by means of that network element”); and 47 C.F.R. at § 51.309(a) (prohibiting incumbent LECs from imposing restrictions on requesting carriers’ use of UNEs).

¹⁶⁹ 47 U.S.C. § 153 (29).

unbundled network elements may be put. But that provision does no such thing. By its terms, section 251(d)(2) requires the FCC to determine *which* elements should be made available for lease, but says nothing at all about the uses to which competitors may put that element once they have leased it. The Commission got it right the first time: use restrictions are prohibited by the plain terms of the Act, and there is “no statutory basis upon which [the Commission] could reach a different conclusion for the long term.”¹⁷⁰

Use restrictions are not only unlawful, they are also anti-competitive. As the Commission has repeatedly found, the great advantage of unbundled network elements for competitors and for competition is that a single element can be used to offer a variety of services, allowing competitors to use an incumbent LEC’s network elements to offer services different from those offered by the incumbent. By depriving competitors of their ability to make full use of the UNEs they obtain from the incumbent LECs, use restrictions would undermine the pro-competitive goals the unbundling provisions of the Act were designed to achieve.

Any rule that would allow competitors to use leased facilities for some purposes, but not for others, while the ILEC can use the same facility for all purposes, would place competitors at a significant disadvantage. Restricting the uses to which competitors can put network elements makes it impossible for them to achieve the same economies of scale and scope as the incumbent,¹⁷¹ and thereby threatens to make leasing uneconomical for *any* service. No competitor could economically operate two redundant sets of facilities – one leased for services when the unbundled element has been approved for particular services, and one owned and operated in some other way for uses that have not been approved.

¹⁷⁰ *Local Competition Order* at ¶ 356.

¹⁷¹ The ability to use the same facilities to provide a multiplicity of services contributes significantly to the incumbent LECs’ ability to achieve the economies of scale and scope that are so critical to their success.

Use restrictions would also prove nearly impossible to administer. A service-by-service use restriction would inevitably draw competitors, incumbents and regulators into a series of endless disputes about which uses were approved and which not, disputes about definitions of whether a given practice is within a permitted “service,” and disputes about whether new services offered with leased facilities should or should not be permitted. The regulatory morass that any use restriction would entail is the very opposite of the deregulatory approach proposed by the Commission in this proceeding.

Similarly, a service-by-service use restriction would stifle innovation. Currently, market forces push competitors to think of new services to offer through existing network elements. This, in turn, spurs the incumbents to roll out new services. If service-by-service unbundling were mandated, these competitive benefits would be replaced by regulatory proceedings and endless litigation. Before offering a new service using an incumbent LEC facility, a competitor first would have to obtain a ruling from the FCC that, without access to the UNEs it needs, the competitor would be impaired in its ability to offer the new service, or that other factors either did or did not permit unbundling. This process would deprive competitors of any first-mover advantage they might gain by developing a new service, because a competitor planning to offer a new service using UNEs leased from the incumbent LEC would have to reveal its plans to the incumbent to gain permission to use the necessary UNEs. In addition, a service-by-service impairment analysis would almost certainly result in disputes between competitors and incumbents over what constitutes a new service versus a previously approved service. As a result, marketplace competition would be replaced by interminable regulatory proceedings. Any rule that encourages such regulatory gamesmanship – indeed, virtually requires it – is profoundly unwise.

Moreover, because the same element can be used for a variety of services, any use restrictions adopted as a result of a service-by-service impairment analysis would have to

be accompanied by a complex administrative prophylactic rule to guard against impermissible uses of the facility. Use restrictions are inevitably difficult, if not impossible, to administer, and can only have the effect of creating needless administrative wrangling that will assure that the elements are not used even for their “permitted” purposes.

The Commission need not speculate about the anti-competitive nature of use restrictions. Its one attempt at such a restriction already has proven disastrous to competition. The Commission has departed from its carefully-reasoned analysis in the *Local Competition Order*, and imposed temporary restrictions on competitors’ use of EELs. Specifically, the Commission has allowed competitors to lease EELs at cost-based rates only if they use them to provide a “significant amount of local exchange service.”¹⁷² Although the Commission in its *Supplemental Order Clarification* established three “safe harbors” designed to assure that EELs would be used to provide a significant amount of local service, these safe harbors are virtually impossible to satisfy as a practical matter.¹⁷³ As a result, when competitive carriers using their own switches need to use incumbent LEC transmission facilities to reach their customers, they usually have to purchase special access services, which provide the same functionality as EELs, but at a much higher price.¹⁷⁴

As with any other use restriction, the EELs restriction plainly violates the 1996 Act. Like any use restriction, it also unnecessarily prevents competitors from making use of facilities in the same flexible way that the ILECs themselves use facilities, and so

¹⁷² *Supplemental Order Clarification* at ¶ 8.

¹⁷³ See, e.g., *ex parte* letter from Chuck Goldfarb, MCI WorldCom, to Mr. Larry Strickling, FCC, CC Docket No. 96-98 (March 10, 2000).

¹⁷⁴ See *Implementation of the Local Competition Provisions of the Telecommunications Act of 1996, Supplemental Order*, 15 FCC Rcd 1760 (1999) at ¶ 4 (prohibiting long distance carriers from obtaining existing EELs in lieu of higher-priced special access services).

harms competition and deprives consumers the advantages competition would bring. And, like any use restriction, it has proven nearly impossible to administer effectively. Specifically, the restriction on EELs has eliminated virtually all uses of loop-transport combinations. This result is anti-competitive and cannot be allowed to stand. The Commission should therefore take this opportunity to withdraw the temporary restrictions on the use of EELs.

The incumbent LECs have sought to undercut competitive carriers by unilaterally placing use restrictions on other UNEs as well. For example, Verizon has taken the position that, when ordered as a UNE, the line information database (LIDB) can be used only to provide local service. Verizon's attempt to impose this use restriction on LIDB is particularly outrageous because the designation of LIDB as a database that must be unbundled was made with the knowledge that the most prevalent use of LIDB is to provide access services.¹⁷⁵ Verizon's attempt to impose a use restriction on LIDB effectively amounts to an effort to eliminate its obligation to provide LIDB as a UNE. The Commission should reject this attempt, and all other attempts, by the incumbent LECs to impose use restrictions on the UNEs they provide to competitors pursuant to section 251(c)(3) for telecommunications services.

In sum, it would both unlawful and unwise for the Commission to impose use restrictions on UNEs.¹⁷⁶ Consistent with the Act, competitive carriers should be allowed to use UNEs to provide any telecommunications service, regardless of whether it is local, long-distance or broadband.¹⁷⁷

¹⁷⁵ LIDB is used to verify the billing telephone number for credit card calls. Given that the vast majority of credit card calls are toll calls, (*i.e.*, long distance calls) it would defeat the purpose of LIDB to limit its use to local services.

¹⁷⁶ *Local Competition Order* at ¶¶ 356, 385, 447-449; *see also Supplemental Order Clarification*, Dissenting Statement of Commissioner Furchtgott-Roth at 4-5.

¹⁷⁷ *See, e.g., Association of Communications Enterprises v. FCC*, 235 F.3d 662 (D.C. Cir. 2001) (*ASCENT*) (rejecting arguments that the incumbent LECs' obligations should not

*b) The Commission Should Not Employ a Service-Specific
Impairment Analysis*

In the *NPRM*, the Commission asks about one kind of use restriction in particular: a restriction that would result from a service-specific impairment analysis.¹⁷⁸ Such a use restriction suffers from all of the same failures as any other use restriction discussed in the previous section: it plainly violates the Act, and would lead to anti-competitive results. In particular, as stated above, section 252(d)(2) requires the Commission to consider “impairment” in determining which elements to unbundle, but it plainly does not allow the Commission to consider impairment in considering which services a competitor should be allowed to offer through an unbundled network element.

In addition to all of the defects described above, service-specific impairment analysis would be completely pointless. If a particular network element is generally available only from the incumbent LECs for one use, that network element will be generally available only from the incumbent LECs for other uses as well. Thus, for example, if requesting carriers are impaired in their provision of local exchange service without unbundled access to the incumbent LECs’ local loop and transport facilities because there are few if any alternatives in the marketplace,¹⁷⁹ then few alternatives exist for carriers seeking to use those same facilities to provide exchange access or other telecommunications services.

Alternatives to a particular element either are available or they are not. The service being provided is completely irrelevant to the analysis.¹⁸⁰ It therefore would be

extend to their provision of “advanced services” and concluding that such services should be treated the same as all other telecommunications services).

¹⁷⁸ *NPRM* at ¶ 40.

¹⁷⁹ See *UNE Remand Order* at ¶¶ 181, 332-333.

¹⁸⁰ For example, if a carrier needs an incumbent-LEC provided EEL to connect its local switch to a customer location, it will need exactly the same line to connect the same customer location to its long-distance switch.

pointless for the Commission to engage in separate impairment inquiries for each service that can be provided using a given network element. The only result would be a needless waste of the administrative resources needed to conduct multiple inquiries leading to the same inexorable conclusion: that the lack of access to a network element for which no alternative exists impairs a requesting carrier's ability to offer *any* telecommunications service using that network element.¹⁸¹ Congress could not have envisioned that the Commission would engage in such a wasteful inquiry.¹⁸²

i. The Commission Should Not Create a "Broadband Exception"

For all of the reasons explained above, the Commission should reject attempts by the incumbent LECs to create a "broadband exception" to their unbundling obligations.¹⁸³ The incumbent LECs have argued that section 251 does not authorize the FCC to require unbundling of elements used to provide broadband services because that market is competitive.¹⁸⁴ This argument suffers from two fatal flaws. First, as explained above, the market for broadband services is *not* competitive.¹⁸⁵ Moreover, even if the retail market for high-speed Internet access or for broadband business services were competitive, that would not affect the incumbent LECs' unbundling obligations.

¹⁸¹ *NPRM* at ¶ 40 (noting that a service-specific analysis would impose additional administrative burdens on both the Commission and on carriers).

¹⁸² *See American Bankers Ass'n v. National Credit Union Administration*, 271 F.3d 262, 267 (D.C. Cir. 2001) (decision-makers must be "guided by a degree of common sense as to the manner in which Congress is likely to delegate a policy decision to an administrative agency") (quoting *FDA v. Brown & Williamson Tobacco Corp.*, 529 U.S. 120, 121 (2000)).

¹⁸³ *See ASCENT*.

¹⁸⁴ *See Brief of Petitioner, USTA v. FCC*, Nos. 00-1012, 01-1075, 01-1102 & 01-1103 (D.C. Cir. 2001)

¹⁸⁵ *See also Review of Regulatory Requirements for Incumbent LEC Broadband Telecommunications Services*, CC Docket No. 01-337, Comments of WorldCom, Inc. at 11-22 (March 1, 2002).

The Act requires the Commission to consider whether failure to provide a requesting carrier with access to a network element would impair that carrier's ability to provide the telecommunications "*it seeks to offer*."¹⁸⁶ The ability of some *end users* to obtain broadband (or broadband-related) services from cable or other providers has no bearing on competitive *carriers'* ability to obtain network elements from those providers. As noted above, cable providers, for example, have no general obligation to provide unbundled access to their broadband facilities, and, in fact, do not provide such unbundled access to competitive carriers. If the Commission were to relieve incumbent LECs of their obligations to provide unbundled access to the network elements needed to offer broadband services, competing carriers would have *no* alternatives for obtaining the inputs they require, thus "impairing" their ability to provide the services they "seek to offer." If a CLEC needs to use the ILEC's copper loop to provide voice services, it needs the same loop to provide broadband services. The fact that the loop is used to provide two different services is completely irrelevant to the question of whether the CLEC has some alternative to using the ILEC loop.

5. Any Attempt to Impose a "More Granular Statutory Analysis" Must Be Guided By Certain Bedrock Principles

The Commission seeks comment on whether it should adopt a more "granular" impairment analysis for determining which network elements should be unbundled. Among other approaches, the Commission asks whether it should consider the availability of UNEs based on geographic considerations (*e.g.*, by MSAs, density zones, or other delineations); type of facility (*e.g.*, circuit-switched versus packet-switched); level of capacity (*e.g.*, DS-1 - DS-3 versus OC-3 - OC-96 dedicated transport services); type of end user (*e.g.*, business versus residential); or temporal or other triggers (*e.g.*,

¹⁸⁶ 47 U.S.C. § 251(d)(2)(B) (emphasis added).

sunset dates, collocation-based triggers, etc.).¹⁸⁷ If the Commission determines that it is appropriate to consider the availability of UNEs based on one of the more granular approaches listed above, its analysis must be guided by the principles identified below.

First, any impairment analysis must be based on meaningful empirical market evidence that is “sophisticated and refined.”¹⁸⁸ For example, the mere existence of a carrier offering service using its own transmission facilities to serve customers in a certain area does not mean that the carrier has sufficient excess capacity to sell transport to other carriers seeking to serve the same location. Similarly, evidence that a carrier has leased collocation space in a particular location does not demonstrate that the carrier can viably serve customers with that facility.

Of course, the difficulty with obtaining such meaningful empirical evidence is that the incumbent LECs are the parties with the greatest access to the relevant data. For example, the incumbent LECs have data regarding their own facilities; requesting carriers’ facilities, interconnections, and collocations; leased UNEs; and requesting carriers’ purchase of special access and other services. However, the incumbent LECs have no incentive to make available to the Commission any data that does not support their positions. If the Commission is to perform a more granular impairment analysis, it therefore must use its authority to compel the ILECs to provide all the data needed to ensure that the analysis is sufficiently “sophisticated and refined.”¹⁸⁹

Second, the Commission must ensure that any geographically granular analysis does not undercut the ability of carriers to serve the mass market. If the Commission relies on geographic analysis to carve out exceptions to UNEs in high density areas,

¹⁸⁷ *NPRM* at ¶¶ 34-46.

¹⁸⁸ *See id.* at ¶ 34.

¹⁸⁹ There may be some situations in which the Commission also must compel requesting carriers to provide data.

without regard to whether those UNEs are being used to serve mass market customers or customers with more specialized needs, then it will place at risk the ability of carriers to serve mass market customers, for whom there will not be a facilities-based option in the foreseeable future. The Commission should adopt nationwide rules regarding UNEs, and not defer any geographic analysis to the states. Failure to adopt nationwide rules would substantially raise the costs associated with national marketing campaigns and potentially eliminate the possibility of ubiquitous competitive services.¹⁹⁰

Third, the impairment analysis must yield bright-line unbundling rules that can be efficiently applied *up front*, when CLECs are making their facilities deployment and market launch decisions. Impairment analyses that are administratively expensive or time consuming to implement, or that introduce uncertainty about the future availability of essential inputs, unnecessarily raise costs for CLECs. This leads to increased prices for consumers and harms competition. Absent certainty about the ongoing availability of essential inputs, carriers should not be expected to expend their limited capital resources to undertake product launches.

Similarly, impairment analyses that give incumbent LECs discretion over the availability of essential inputs inhibit competition. For example, any analysis that allows the incumbent LEC to determine whether a new service meets the impairment standard (or whether a request for a UNE violates a use restriction) will have a chilling effect on competition.¹⁹¹ Other triggers, such as those that would condition availability on future

¹⁹⁰ Where more detailed and refined state-specific market evidence so warrants, however, state regulators should be able to expand ILEC requirements to offer UNEs in their jurisdictions beyond those set by the Commission. The proposition does not work, in the reverse, however, because the scope and scale economies associated with mass marketing and nationwide service offerings extend beyond state boundaries. Thus state regulators should not be able to restrict access to UNEs that are available under the federal rules.

¹⁹¹ The current experience with EELs demonstrates this point. Except in a minority of cases where state regulatory commissions have interceded, ILECs have made themselves the initial interpreters of the Commission's safe-harbor rules and have used these rules to

actions that cannot be predicted today (*e.g.*, attaining particular loop provisioning standards), would also harm competition. The current system of periodic review is a far better approach because it permits requesting carriers to make business plans based on the certainty that specific UNEs will be available for some time period, preferably five years.

6. The Commission Should Not Adopt an Automatic Sunset Date

The Commission also seeks comment on whether it should establish a sunset date for UNE availability.¹⁹² WorldCom views a sunset provision as contrary to the statute, unnecessary and counterproductive. In determining what network elements should be unbundled, the Act requires the Commission to consider whether “the failure to provide access to such network elements would impair the ability of the telecommunications carrier seeking access to provide the services that it seeks to offer.”¹⁹³ This statutory mandate does not lend itself to sunset provisions that are inherently based on future predictions.

The Commission simply cannot predict today that at some defined future date, lack of access to UNEs will not impair carriers' ability to offer service. No UNE should be eliminated unless it is unequivocally clear that alternatives are available and that competitive carriers will not be impaired by the removal of the UNE from the national list. Moreover, automatic sunset dates would reduce incumbent LECs' incentives to comply with their statutory obligations. In fact, an automatic sunset date would provide

deny CLECs access to EELs in almost all circumstances. *See, e.g.*, Letter of Jonathan Askin, General Counsel, ALTS to Jodie Donovan-May, Common Carrier Bureau, FCC, CC Docket No. 96-98 (Dec. 22, 2000); *see also* Petition of ITC^DeltaCom Communications, Inc. for Waiver of Supplemental Order Clarification, CC Docket No. 96-98 (Aug. 16, 2001); *see also* Petition of WorldCom for Waiver of Supplemental Order Clarification (Sept. 12, 2000).

¹⁹² *NPRM* at ¶ 45.

¹⁹³ 47 U.S.C. § 251(d)(2)(B).

incumbent LECs with an incentive to strategically delay the availability of UNEs until the sunset date arrives.¹⁹⁴

7. Competitors Must Be Able to Lease UNEs at TELRIC-Based Rates

In paragraph 24 of the *NPRM*, the Commission seeks:

comment on whether we should modify or limit incumbents' unbundling obligations going forward so as to encourage incumbents and others to invest in new construction. . . . Additionally, we seek comment on whether, in lieu of limiting incumbents' unbundling obligations to encourage investment in new facilities, we might clarify or modify our pricing rules to allow incumbent LECs to recover for any unique costs and risks associated with such investment. Would such an approach adequately encourage new construction?

These questions go to the core of the economic theory and policy analysis underlying the UNEs requirement. Will imposing restrictions on competitors' access to essential network facilities, or charging above-cost rates for those facilities, foster *efficient* investment and ultimately expand choices and/or cut prices for consumers, or will they have the opposite effect?

Recently, Professor William J. Baumol filed a concise paper that directly addresses these issues.¹⁹⁵ In his paper, Professor Baumol describes the analytical

¹⁹⁴ For instance, in 1998, WorldCom filed two complaints to enforce the Bell Atlantic/NYNEX merger conditions, which were set to sunset on Aug. 14, 2001. *See, e.g., MCI Telecommunications Corp. and MCI Metro Access Transmissions Services, Inc.*, File No. E-98-12 (Aug. 18, 2000) (*TELRIC Complaint*) and *MCI Telecommunications Corp. and MCI Metro Access Transmissions Services, Inc.*, File No. 98-32 (December 3, 2001) (*Performance Standards Complaint*). The TELRIC complaint was not decided until Aug. 18, 2000 – three years into the four-year period of the conditions – and the performance standards complaint was not decided until Dec. 3, 2001, six months after the expiration of the merger conditions. There was absolutely nothing to ensure, or even encourage, the merged entity's compliance with the conditions while the section 208 complaints to enforce the conditions were pending, and no other enforcement action was being taken.

¹⁹⁵ *See Deployment of Broadband Networks and Advanced Telecommunications*, NTIA Docket No. 011109273-1273-01, Comments of William J. Baumol, "Response to the NTIA Request for Information on Broadband," *available at*

framework that underlies the Telecommunications Act of 1996 and the Commission's implementation of the Act to date – a framework that fosters efficient investment by incumbents and new entrants alike by basing input rates on forward looking economic cost, including risk-related costs. He also addresses the fallacies underlying arguments made by incumbent LECs and others that abandoning the existing regulatory framework will foster additional investment in facilities. These parties argue for deregulation before there is competition, and for allowing incumbent carriers to set wholesale rates for input elements above forward-looking cost when their competitors still lack viable alternatives to those elements. The consequences of such a course would be reduced investment by carriers, which would result in less choice and higher rates for consumers.¹⁹⁶

i. Monopoly Providers Lack the Incentive to Invest in New Facilities or Services

It is wrong to assume that carriers that enjoy monopoly power have the same incentives to make pro-consumer decisions, as they would have in effectively competitive markets. Providers in effectively competitive markets face market pressures to make output, investment, and pricing decisions that serve the consuming public well. They have no incentive to restrict output or investment because they lack the ability to raise prices to exploit artificial scarcity and they have no monopoly markets to protect from “cannibalization” by new products. Thus, in effectively competitive markets there is no need for regulatory intervention. In contrast, carriers that retain significant monopoly power have the incentive to restrict output and investment to create artificial scarcity and to minimize the risk of cannibalizing existing product offerings that are selling at prices above what they would be able to charge in a competitive market. Furthermore, as Professor Baumol explains, a

<<http://www.ntia.doc.gov/ntiahome/broadband/comments4/Baumol.htm>> (*Baumol*).

¹⁹⁶ The following discussion basically tracks Professor Baumol's key arguments.

firm's incentive to restrict investment in [monopoly] markets is further enhanced where such investment can be expected to render current plant and equipment obsolete. There, the dominant incumbent, immune from material competitive pressures, can be expected to resist such change by keeping its investments to a minimum, protecting the earning power of its old equipment until and if management's hand is forced by the incursion of substantial rivals whose more modern facilities threaten the business of the incumbent.¹⁹⁷

This behavior is evident in telecommunications markets today. As explained above, although DSL technology has been available for many years, ILECs initially chose not to deploy it at all because of a fear that it would cannibalize their T-1 service offerings. It was only when competitive LECs such as Covad, Rhythms, and NorthPoint attempted DSL entry and cable companies offered cable modem competition that ILECs began to deploy DSL technology throughout their networks. Even when they began offering DSL services, ILECs restricted their offerings to those designed for residential customers, ensuring that business customers would not take DSL services in lieu of T-1s. Only CLECs offer business-grade DSL, and the ILECs now seek to eliminate these offerings by removing unbundling requirement and pricing regulations.

ii. Monopoly Providers Lack the Incentive to Set Prices Competitively

It is also wrong to assume that monopolists that are allowed to set above-cost rates and generate monopoly profits will have an incentive to increase output and investment and better serve the consuming public. Basing regulatory policy on this fallacy will have harmful consumption and investment effects. Allowing a monopoly provider of an input to raise wholesale prices above TELRIC cost, will result in higher retail costs for consumers. Moreover, higher retail prices will reduce consumer demand. Especially in markets such as broadband, where demand is weak at current retail rates

¹⁹⁷ *Baumol* at p. 2.

(less than four percent of customers with access to DSL or cable modem service currently subscribe), raising those rates will further weaken demand.¹⁹⁸

Telecommunications networks are characterized by strong economies of scale and scope, especially in outside plant (*i.e.*, loop and transport). Wherever the economies and investment costs associated with a particular network element are significant, it will be far more costly for CLECs to replicate the network element than for the ILEC to configure the capacity of that element in its network to handle total ILEC and CLEC demand for the element. CLECs therefore will be impaired in their ability to offer service if they cannot obtain a network element they require from the ILEC. In this situation, the efficient investment decision for that network element, from society's perspective, is to have the incumbent build the facilities and provide unbundled access at rates that fully compensate the ILEC for all costs, including risk-related costs. As discussed below, TELRIC is the appropriate costing/pricing methodology to use. The outcome of such mandatory unbundling and pricing is to create a wholesale input market that mimics competitive wholesale markets of the sort that exist for long distance telecommunications.

In the absence of regulatory directives, however, monopoly ILECs will choose either not to participate in a wholesale market or to sell only at monopoly rates that raise the costs for all competitors. This behavior does not demonstrate that TELRIC-based rates are too low for the ILEC to earn a competitive profit from their network investments; it only demonstrates that ILECs prefer to earn monopoly profits. So long as UNE rates are set at the cost-based levels that prevail in competitive markets, investment incentives will be consistent with the requirements of economic efficiency.

¹⁹⁸ See National Telephone Cooperative Association, *NTCA 2001 Internet/Broadband Availability Survey Report* (Dec. 2001) at p. 3, available at <http://www.ntca.org/leg_reg/white/2001bb_survey.pdf>.

*b) TELRIC provides the Correct Measure of the Incumbent
LECs' Costs*

TELRIC methodology takes into account the investment needed to serve both ILEC and CLEC use. It takes into account the economies of scale and scope inherent in the ILECs' networks. It also takes into account the risk associated with building a network to serve both ILEC and CLEC use. Thus, there is no need for a separate, additive calculation of the depreciation and risk cost associated with serving CLEC use.

TELRIC methodology takes risk into account in two ways – through the depreciation rates used for facilities and through the risk-based cost of capital used. Thus, TELRIC-based rates already incorporate the risk associated with building a network for CLEC as well as ILEC use. In fact, CLECs' use of the network lowers ILEC risk. By basing UNE rates on TELRIC and providing the correct pricing signal to CLECs about their lease-investment decisions, the current system ensures that CLECs are not encouraged to make inefficient facilities investments (and leave the ILEC network) based on a comparison between the costs of self-provisioning versus an inflated lease rate. This reduces the risk of ILEC investment being stranded by CLECs making inefficient investments in their own facilities. It also highlights an inconsistency in much ILEC advocacy that claims competitive entry adds to their risk. On one hand, ILECs complain that the unbundling requirement forces them to undertake substantial additional investment. On the other hand, ILECs complain that CLEC entry places them at great risk of stranded investment. In fact, ILECs can minimize the risk of stranded investment by setting TELRIC-based rates that allow CLECs to make efficient investment decisions. ILECs, being familiar with underlying network costs, will know where scale and scope economies are too substantial for CLECs to make efficient investments. TELRIC also ensures that the ILECs will be sufficiently compensated for any additional investments they make in their networks to provide UNEs.

ILECs have long been champions of incremental cost pricing for their competitive services. In state after state, in competitive pricing proceedings, they have sought permission to set price floors for their competitive services at long run incremental cost, which is lower than TELRIC.¹⁹⁹ In every case, they argued that incremental cost pricing was fully compensatory and sufficient to allow them to recover their investments fully, including associated risk costs. For example, ILECs have invested tens of millions of dollars in Centrex facilities (which compete with PBX) while simultaneously seeking permission to price Centrex service at Long Run Incremental Cost (LRIC). They would not have undertaken these investments and sought these pricing floors had they not viewed LRIC pricing as fully compensatory. There is no reason why pricing wholesale services at TELRIC-based rates, which exceed LRIC rates, would be less compensatory or provide less incentive for network investment.

ILECs argue that TELRIC measures the hypothetical costs of an ideal network rather than actual costs, and therefore understate costs. In fact, effectively competitive markets drive prices toward the current value of the assets needed to provide a good or service, not toward historic costs, and providers operating in these markets must take this into account. They understand that their actual cost outlays will not coincide with their revenue in-takes, as the timing of depreciation expenses do not exactly coincide with investment outlays. But effectively competitive markets implicitly take depreciation into account when determining price. Similarly, the TELRIC methodology takes technological and market depreciation into account when calculating forward-looking economic costs by incorporating appropriate depreciation rates. Where technology

¹⁹⁹ See, e.g. George W. Costello, *The Use of Incremental Costs in Regulatory Proceedings, Determining the Economic Cost of Actions Requiring Regulatory Review, in Marginal Cost Techniques for Telephone Services: Symposium Proceedings* 666 (William Polard ed. 1991).

evolves rapidly, higher depreciation rates are incorporated explicitly in TELRIC cost studies, just as they would be incorporated implicitly in market rates.

c) *Setting UNE Rates at TELRIC Will Not Adversely Affect
Funding for Universal Service*

The overriding objective of the 1996 Act was to foster competition in all telecommunications markets and to eliminate regulatory and other impediments to such competition. In order to accomplish this goal, implicit subsidies that were built into certain rates had to be eliminated. When the Commission began the monumental task of implementing the 1996 Act, it recognized that it had three major undertakings, all of which were inter-related: creating the interconnection, unbundling, pricing and other rules needed to implement Section 251, universal service reform, and interstate access charge reform.

In access reform, the Commission had to remove implicit subsidies from interstate access charges; in universal service reform, the Commission had to create explicit universal service funds to replace the implicit subsidies. Today, access charge reform is almost entirely completed. As the Commission found in its *Access Charge Reform Order*,²⁰⁰ it had already been “established Commission practice that special access will not subsidize other services.” With the implementation of the subsequent *CALLS Order*,²⁰¹ implicit universal service subsidies were removed from interstate switched access rates as well. Although interstate switched access rates under the CALLS plan continue to exceed TELRIC, none of the above-cost revenues generated by these services are attributable to universal service subsidies. As a result, if requesting carriers choose to substitute TELRIC-based UNEs for either switched or special interstate access services, there is no impact on universal service funding.

²⁰⁰ See *Access Charge Reform*, First Report and Order, 12 FCC Rcd 15982 at ¶ 404.

²⁰¹ See *Access Charge Reform*, Sixth Report and Order, 15 FCC Rcd 12962.

8. UNEs Play an Important Role in Sustaining Competition for Long-Distance Services

The unbundling rules do not operate in a vacuum, and their benefits are not limited to local services. In reviewing the unbundling rules, the Commission should therefore examine the effects any changes will have on competition throughout the communications industry. Specifically, it is critical that the Commission consider the important role UNEs play in maintaining competition for long-distance services.

FCC policies have succeeded in creating robust competition in the long-distance business. According to recent FCC statistics, more than 700 competitors now offer long distance services.²⁰² Since the divestiture of the nation's monopoly provider of long distance and local services in 1984, AT&T's share has continued to erode from its high of 90% to less than 40% in 2000.²⁰³

Since competition was introduced in 1984, long distance rates have declined by more than 70% (adjusting for inflation),²⁰⁴ while local rates have not declined, and the quality of long distance networks has improved significantly. Many analysts predict that falling long-distance prices will continue their downward trend for the next several years.²⁰⁵ Specifically, consumer and business long distance prices are expected to fall about 10 - 11% over the next few years, compared to 9% in the prior five-year period.²⁰⁶

If the FCC were to deprive competitive providers of access to UNEs, it would risk undermining competition for long-distance services by enhancing incumbent LECs' ability to leverage their power in the local market to harm their long-distance

²⁰² FCC *Trends in Telephone Service*, Industry Analysis Division, Common Carrier Bureau (August 2001) at Table 10.4, p. 10-10.

²⁰³ *Id.* at p. 10-3.

²⁰⁴ *Id.* at p. 14-1.

²⁰⁵ See Consumer Federation of America, *Lessons From the 1996 Telecommunications Act: Deregulation Before Meaningful Competition Spells Consumer Disaster*, February 2001 at 3; See also *J.P. Morgan* at p. 52.

²⁰⁶ *Id.*

competitors. Due to interLATA restrictions on the BOCs, most customers today receive long-distance services from interexchange carriers other than the BOCs. This is changing, however, as the BOCs obtain section 271 approval and begin to offer interLATA services originating within their territories. The FCC already has approved BOC 271 applications for 10 states²⁰⁷ and some estimates indicate that as many as 20 or more 271 applications for BOC in-region long distance could be filed before the end of 2002.²⁰⁸ As they enter the long-distance business, the BOCs often market their long-distance and local offerings as a package, providing their customers with “one-stop shopping.” Using this strategy, the BOCs have been able to gain share in the long distance business extremely rapidly.²⁰⁹ Some analysts predict that the incumbents will capture about 30% of the consumer and 22% of business retail long distance revenues by 2006.²¹⁰

If they are to compete successfully against the BOCs, other carriers must be able to provide similar packages of local and long distance services. WorldCom and others depend on incumbent LEC-provided UNEs for the “last mile” facilities they need to provide the “local” (exchange and exchange access) part of the local-long distance package. If the Commission were to reduce or eliminate the incumbent LECs’ obligation

²⁰⁷ The states where the FCC has authorized the RBOCs to provide in-region long distance services are (in order of approval): New York, Texas, Kansas, Oklahoma, Massachusetts, Connecticut, Pennsylvania, Missouri, Arkansas and Rhode Island. Currently, 271 petitions pending at the FCC include: Vermont, Georgia, Louisiana, Maine and New Jersey.

²⁰⁸ Arnhold and L. Bleichroeder, Inc., *Global Viewpoint – U.S. Telecom Services: Deconstructing Telecom – RBOCs as Net Winners* (David A. Bench, Analyst) (Feb. 5, 2002) at pp. 42, *et seq.*

²⁰⁹ For example, in an Oct. 30, 2001 8-K filed with the SEC, Verizon reported that it had a 31.7% share of New York long distance customers. Verizon 3Q 2001 Earnings Release, *available at* <<http://investor.verizon.com/SEC/html/0000950134/0000950134-01-507762.html>> at p. 4.

²¹⁰ *J.P. Morgan* at p. 60.

to provide rivals with UNEs at cost-based rates it would undermine competition in the long-distance business, and wipe out all the gains the Commission has worked so hard to create.

B. Effective Unbundling Rules Are Critical to Competition for Business Services

1. Competitive Carriers' Ability to Serve Business Customers Would Be Impaired Without Unbundled Access to High-Capacity Loops

Less than one year ago, three of the BOCs jointly filed a petition asking that the Commission eliminate the mandatory unbundling obligation for so-called "high-capacity" loops and dedicated transport.²¹¹ The BOCs included any circuit of DS-1 or greater capacity in this category, despite the fact that a DS-1 is nearer in bandwidth to a voice-grade circuit than it is to a DS-3, let alone an OC-48.²¹² This attempt to lump circuits of widely differing bandwidths into a single category is nonsensical. It is unlikely that the competitive alternatives for customers that require DS-1-level service, would be identical to those for customers that need OC-n connectivity. By aggregating lower-bandwidth circuits such as DS-1s into the same category as optical level circuits, the BOCs seek to obscure the fact that CLEC alternatives for DS-1 circuits are much more limited than their alternatives for optical level circuits. To fairly assess impairment, the Commission therefore must look at the competitive landscape relevant to each circuit type.

a) DS-1 Loops

As outlined above, for the vast majority of buildings where there is likely to be demand for DS-1 circuits, there are no alternatives to the incumbent LECs' facilities.

²¹¹ Joint Petition of BellSouth, SBC, and Verizon for Elimination of Mandatory Unbundling of High-Capacity Loops and Dedicated Transport (filed April 5, 2001), CC Docket No. 96-98.

²¹² A DS-1 can be channelized into 24 voice grade (DS-0) circuits. A DS-3 is the equivalent of 28 DS-1s or 672 DS-0s. An OC-48 is the equivalent of 48 DS-3s, or 1,344 DS-1s.

Competitive alternatives fall far short of the ubiquity that the Commission requires before it can find no impairment. While the incumbent LECs are able to provide service to virtually every location where there is demand for DS-1 service,²¹³ competitors are able to provide DS-1s only to approximately 30,000 buildings nationwide. As explained in the *Reynolds Confidential Ex Parte*, WorldCom alone relies on ILEC-provisioned circuits to provide services to customers in a vast number of buildings where the ILEC is the exclusive provider of last-mile facilities.²¹⁴

Given that competitive alternatives to ILEC DS-1 loops exist in only a fraction of the buildings where there is demand for DS-1s, requesting carriers would plainly be impaired if they were denied unbundled access to DS-1 loops. As the Commission found in the *UNE Remand Order*, the cost and timeliness issues contribute to the impairment that would follow denial of unbundled access to these loops. As in 1999, the fixed costs of constructing loop plant continue to be quite high. According to the *Fleming Declaration*, the cost of recent building “adds” for WorldCom has averaged about \$250,000.²¹⁵ And the process of adding a building can take six to nine months or longer. Meanwhile, standard intervals in the ILEC tariffs for installing DS-1 circuits typically range from seven to ten business days.

b) DS-3 Loops

Even for DS-3 loops, competitors still do not provide ubiquitous alternatives to ILEC facilities. CLECs are able to provide DS-3 service to no more than 30,000 buildings nationally. As with DS-1s, only the ILECs possess definitive information about the number of locations to which they provide DS-3 loops. However, WorldCom alone

²¹³ Only the ILECs know the precise number of locations in which they provide one or more DS-1s, and they have failed to include that number in the various “fact reports” which they have issued from time to time.

²¹⁴ *Reynolds Confidential Ex Parte* at ¶ 6.

²¹⁵ *Fleming Declaration* at ¶ 8.

relies on ILEC last-mile DS-3s to reach thousands of buildings where the ILEC is the exclusive provider. Thus, it is likely that the ILECs provide DS-3 loops to many thousands of building where there is no alternative provider. As with DS-1s, self-provisioning loops to these locations would be extremely costly and time-consuming. Accordingly, requesting carriers would be impaired if denied unbundled access to ILEC DS-3 loops.

c) OC-n Loops

There is very little reliable information on the distribution of demand for these very high capacity circuits. That demand is undoubtedly more concentrated than demand for DS-1s, or even DS-3s. Moreover, it is likely that CLECs have built to relatively more locations with OC-n customers than to locations with lower bandwidth demand, since there is a higher probability that buildings with such customers will generate sufficient revenues to justify the high cost of network construction. Nonetheless, the best available evidence shows that the ILECs possess far more extensive fiber networks than their rivals. For example, the New York PSC found that in LATA 132, perhaps the most competitive geographic area in the nation, Verizon's fiber network extends to seven times as many buildings as all of its competitors combined.²¹⁶ This strongly suggests that even collectively CLECs are not close to providing ubiquitous alternatives to ILEC loops.

2. Competitors Would Be Impaired Without Unbundled Access to Transport

As was the case when the Commission adopted the *UNE Remand Order*, alternative transport is still available only on "selected point-to-point routes ... in dense markets."²¹⁷ No competitor provides alternative transport to more than a handful of incumbent LEC central offices. In many of the wire centers with competitive transport

²¹⁶ *NYPSC Special Services Order* at 7.

²¹⁷ *UNE Remand Order* at ¶ 333.

only a single alternative is available. In addition, many wire centers can be reached via CLEC transport only by using less efficient routing, or if the requesting carrier incurs the additional cost of coordinating multiple vendors.

WorldCom's experience shows that even the largest self-providers of transport must rely on the ILECs for most interoffice routes. Despite WorldCom's extensive local networks, WorldCom can self-provide transport to only a small fraction of the approximately 22,000 incumbent LEC wire centers.

Because existing competitive fiber networks still reach only a small percentage of ILEC wire centers, CLECs are still impaired without access to unbundled transport. As the Commission found in the *UNE Remand Order*, requiring CLECs to self-provide or acquire transport from third parties "materially increases ... costs of entering a market or of expanding ... service, delays broad-based entry, and materially limits the scope and quality of [their] service offerings."²¹⁸

A CLEC's ability to self-supply transport is, as a general matter, limited by the high fixed and sunk costs associated with the construction of transport facilities. As explained in the *Fleming Declaration*, the extension of a WorldCom local network to an additional ILEC central office generally costs at least \$1 million, and costs substantially more if the target central office is located several miles from WorldCom's existing network, as is typically the case.²¹⁹

Because the fixed and sunk costs of extending a CLEC network to an additional central office are so high, it is generally not viable for CLECs to self-supply transport unless the route is relatively short and the traffic density relatively high. For a more typical route, a CLEC's per-circuit cost of self-provisioning transport would be very high as the CLEC would incur costs of well over \$1 million and could reasonably expect to

²¹⁸ *Id.* at ¶ 321.

²¹⁹ *Fleming Declaration* at ¶¶ 13-14.

win only a portion of the demand on that route. By contrast, the cost of obtaining DS-1 transport from the incumbent LEC can be as low as \$40 per month for a five-mile circuit. This significant differential between CLEC costs and the forward-looking cost of the incumbent's element reflects the economies of scale disadvantages faced by CLECs. Under the impairment standard, this material difference in cost demonstrates that self-provisioning is not a practical and economic alternative to the incumbent LEC's unbundled network elements for most interoffice transport routes.

Even if there were no cost differential, replication of the incumbent's ubiquitous transport network would significantly delay competitive entry. Indeed, WorldCom alone has customers that utilize DS-1 or higher bandwidth in over 6,800 BOC wire centers, the vast majority of which are not served by CLEC transport. The construction of competitive transport facilities to thousands of incumbent LEC wire centers would take many years. This significant delay to competitive entry is clear evidence that CLECs would be impaired if denied access to unbundled dedicated transport.

3. Incumbent LECs Must Provide Multiplexing in Conjunction With UNE Loops and Transport

Although the Commission's rules plainly require incumbent LECs to provide all "features, functions, and capabilities" of both the loop and transport elements,²²⁰ incumbent LECs have claimed that this creates no obligation to provide requesting carriers with multiplexing functionality.²²¹ The Commission must make it clear that the

²²⁰ 47 C.F.R. §§ 51.319(a)(1); 51.319(d)(2)(ii).

²²¹ See, e.g., In the Matter of Petition of WorldCom, Inc. Pursuant to Section 252(e)(5) of the Communications Act for Expedited Preemption of the Jurisdiction of the Virginia State Corporation Commission Regarding Interconnection Disputes with Verizon-Virginia, Inc., and for Expedited Arbitration, CC Docket No. 00-218, In the Matter of Petition of Cox Virginia Telecom, Inc. Pursuant to Section 252(e)(5) of the Communications Act for Preemption of the Jurisdiction of the Virginia State Corporation Commission Regarding Interconnection Disputes with Verizon Virginia Inc., and for Arbitration, CC Docket No. 00-249, In the Matter of Petition of AT&T Communications of Virginia Inc., Pursuant to Section 252(e)(5) of the Communications Act for

duty to provide multiplexing is co-extensive with the duty to provide unbundled access to loops and transport.

One of the “features, functions, and capabilities” of a loop or transport circuit is that its capacity may be “channelized,” *i.e.*, subdivided into several lower capacity circuits. For example, it is technically feasible to subdivide the capacity of a DS-3 circuit into several DS-1 and DS-0 channels. Thus, for the incumbent LECs to meet their obligation to provide unbundled access to all the features, functions, and capabilities of the loop and transport elements, they must allow requesting carriers to specify where and how those elements are to be multiplexed. Any other outcome would produce blatant discrimination in violation of section 251(c)(3), as the incumbent LECs would be free to provide multiplexing for their retail operations in whatever manner they or their customers require.²²²

4. Competitors’ Ability to Provide the Services They Seek to Offer Would Be Impaired Without Unbundled Access to EELs

The above analysis plainly shows that requesting carriers would be impaired if denied unbundled access to DS-1 loops, DS-3 loops, OC-n loops, and dedicated transport. It follows that they would also be impaired if denied unbundled access to the combination of loop and transport elements, commonly referred to as EELs. If requesting carriers were given access to unbundled loops and transport, but required to combine these elements themselves, they would have to establish costly collocation sites in every ILEC central office and dispatch personnel to those facilities each time a combination had to be made or undone.

Preemption of the Jurisdiction of the Virginia Corporation Commission Regarding Interconnection Disputes With Verizon Virginia Inc., CC Docket No. 00-251, Verizon VA’s Direct Testimony On Mediation Issues, Unbundled Network Elements, Testimony of Margaret Detch, Susan Fox, Steve Gabrielli, Nancy Gilligan, Richard Rousey, Alice Shocket and Vincent Woodbury at 4-6 (Aug. 17, 2001).

²²² 47 U.S.C. § 251(c)(3).

Competitors require EELs to reach end user customers served out of distant end offices where it is not economically feasible to collocate. These customers should not be denied the competitive alternatives that may be available to customers located in more densely populated areas. As WorldCom has already demonstrated, competitive carriers are plainly impaired by the denial of unrestricted, non-discriminatory access to EELs.²²³ The Commission should therefore require that ILECs provide non-discriminatory access to EELs.

5. The Commission Should Enforce the Availability of Required UNEs and UNE Combinations

Mandatory unbundling of certain network elements will prove a Pyrrhic victory for competitive carriers if the incumbent LECs are able to avoid providing those elements in a reliable manner. Indeed, the Commission has implicitly recognized the critical importance of this concern in a recent Notice of Proposed Rulemaking.²²⁴ Yet, when it comes to unbundled DS-1 loops and transport circuits, the incumbent LECs have erected an obstacle course of operational barriers designed to steer their competitors away from unbundled network elements and towards above-cost interstate access services. It is important for the Commission in this proceeding to raze those barriers by declaring such practices unlawful.

First, the Commission should expressly authorize the practice known as "co-mingling."²²⁵ WorldCom and other carriers commonly purchase multiplexing pursuant to

²²³ *Implementation of the Local Competition Provisions of the Telecommunications Act of 1996*, CC Docket No. 96-98, Comments of WorldCom, Inc. (April 5, 2001).

²²⁴ *Performance Measurements and Standards for Unbundled Network Elements and Interconnection*, CC Docket No. 01-318, Notice of Proposed Rulemaking (Nov. 19, 2001).

²²⁵ As used by the Commission, "co-mingling" is the practice of combining loops or loop-transport combinations with tariffed special access services. *Supplemental Order Clarification* at ¶ 28. For example, a competitive LEC might have a DS-1 circuit that is currently connected to a DS-3 hub in an intermediate end office. The competitive LEC should be able to convert that DS-1 to an EEL to provide local service without making

incumbent LEC interstate access tariffs. There is no legitimate reason why requesting carriers should be prohibited from assigning unbundled loops or EELs to individual channel assignments on these multiplexers. This practice would allow competitive carriers to operate their networks more efficiently. Moreover, there is no harm to the incumbent LECs from this practice, except the harm of permitting competitors to operate more efficiently.

Second, the Commission must clarify the circumstances in which it is legitimate for an incumbent LEC to reject a UNE order based on an assertion of "no facilities." As discussed above, it appears that incumbent LECs may frequently claim that no facilities are in place, in circumstances in which they would not hesitate to fill an order for a retail customer. For example, Verizon has adopted a policy that allows it to invoke the "no facilities" response, even when all that is needed is a relatively trivial change to certain attached electronics. The Commission must make it plain that the obligation to provide UNEs applies in all circumstances where an incumbent would provision service for its own retail customers. Any other rule would be discriminatory on its face.

C. UNEs And UNE-P Are Critical To Competition For Mass Market Customers

1. Consumers Benefit from UNE-P Based Competition

UNE-P is the only method capable of creating widespread local competition and it is undisputed that such competition is desirable. Indeed, in every state in which WorldCom's MCI Group provides local service via UNE-P, it offers consumers

any changes to its channel facility assignment on the DS-3 hub. Yet the incumbent LECs insist that this would amount to "co-mingling" of UNE and interstate special access circuits, which they argue is forbidden. In effect, the incumbent LECs would force competitive LECs to maintain two separate access networks – one for access to UNE circuits, the other for access to special access circuits.

innovative products and competitive pricing.²²⁶ MCI offers stand-alone local service, as well as packages of local and long distance services for consumers with a wide variety of needs and calling patterns. The options it offers include unlimited local calling, an option previously unavailable to customers in some areas, such as parts of New York City. One of MCI's flagship products, Local Choice, includes unlimited local calls plus a "bucket" of 200 "anytime" minutes for use with any in-state or interstate calling plan. This product spares consumers the confusion of the LATA system. MCI's entry in Pennsylvania, for example, eliminated the need for consumers to understand complicated and arcane area distinctions in the "band" system to determine if a local call fell into the unlimited or toll call category. CLEC entry also results in reduced prices for consumers. In Michigan, MCI offers an unlimited local calling plan for half the price originally offered by Ameritech. In response, Ameritech subsequently dropped its price for its own unlimited local calling product by more than 50% – a perfect example of how competition benefits consumers.

a) There Are No Disadvantages to Making UNE-P Available

The availability of UNE-P has no offsetting disadvantages. Despite ILEC claims to the contrary, the availability of UNE-P does not deter CLECs from deploying facilities where practical, as is evident by the 1.2 million access lines being provided via competitors' switches in New York.²²⁷ There is no need for regulators to create or adjust regulations to encourage facilities-based service.²²⁸ The market itself already provides an

²²⁶ In the states in which MCI offers local service, it does not always offer service state-wide because the UNE rates are often set at levels in certain areas that do not enable MCI to compete, even with a premium product.

²²⁷ *Proceeding On Motion of the Commission to Consider Cost Recovery by Verizon and to Investigate the Future Regulatory Framework*, Case 00-C-1945, Panel Testimony of New York Department of Public Service (Feb. 2002) at p. 434.

²²⁸ For example, there is no need for regulations that prohibit CLECs from serving more than a certain percentage of their customer's access lines using UNE-P or "require that they migrate customers to its own facilities once it begins providing service to a sufficient